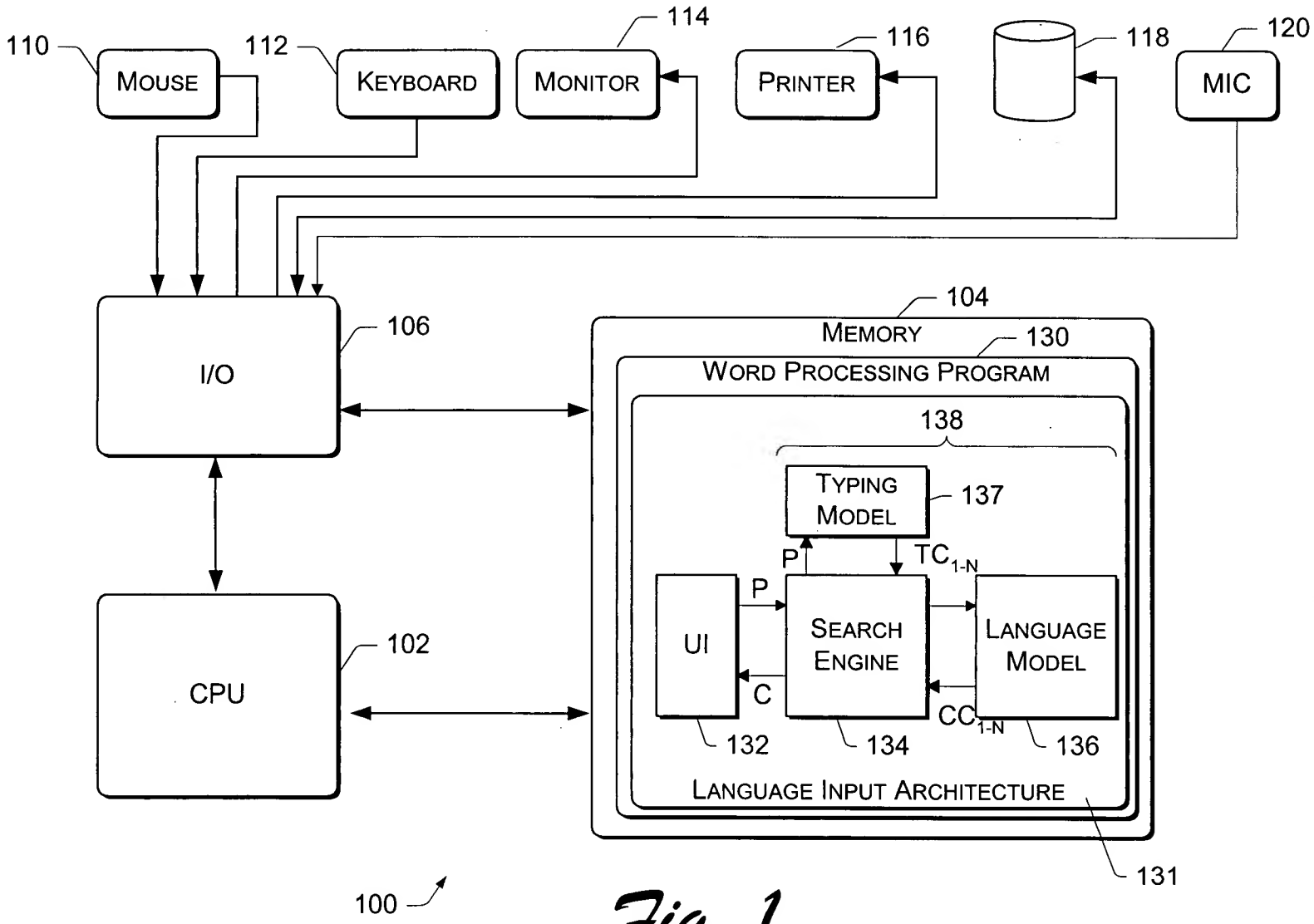
110
MOUSE
112
KEYBOARD
114
MONITOR
116
PRINTER
118
120
MIC
I/O
106
CPU
102
104
MEMORY
130
WORD PROCESSING PROGRAM
138
TYPING MODEL
137
P
TC1-N
P
UI
SEARCH ENGINE
LANGUAGE MODEL
C
CC1-N
132
134
136
LANGUAGE INPUT ARCHITECTURE
131
100

Fig. 1

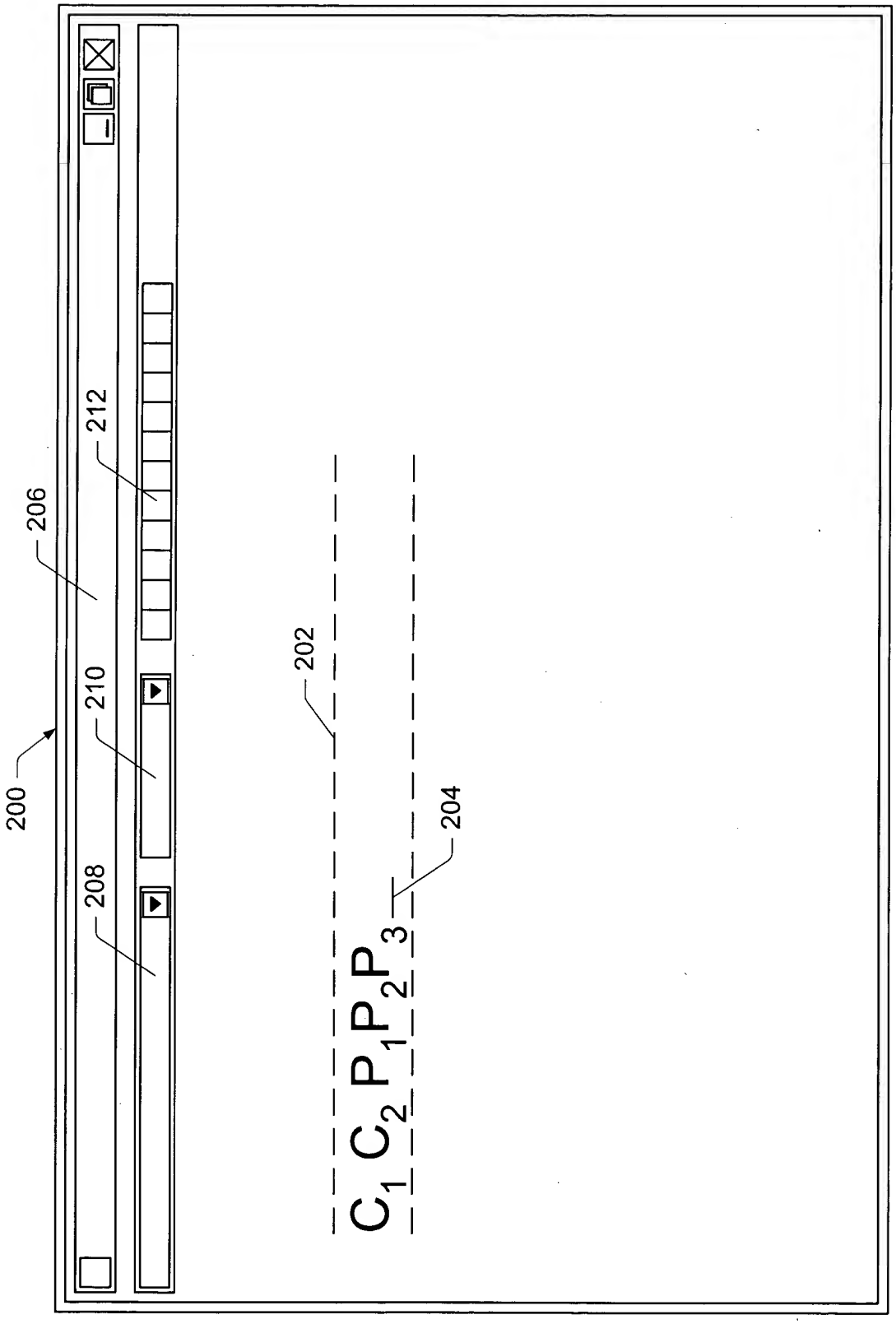

Fig. 2

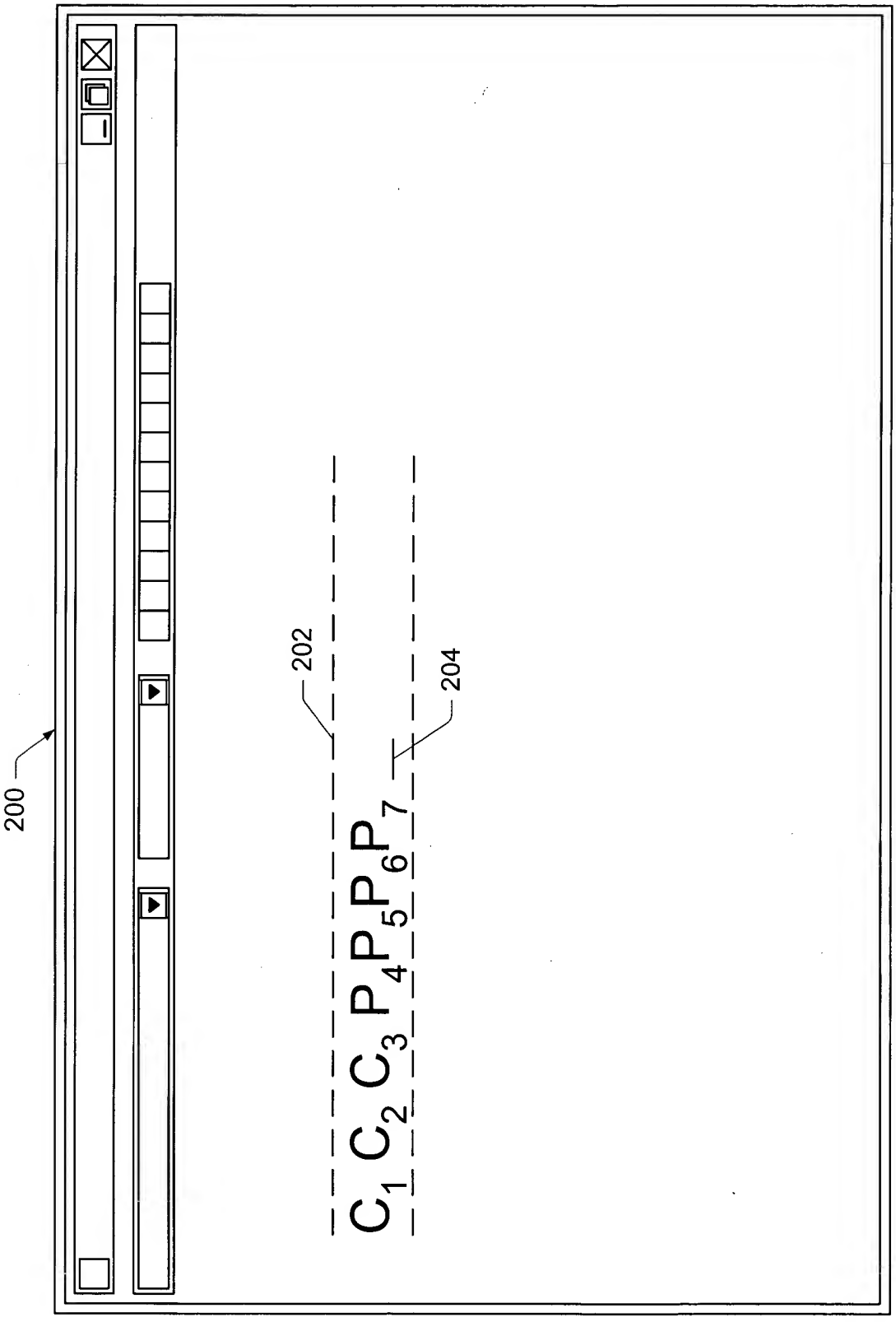

Fig. 3

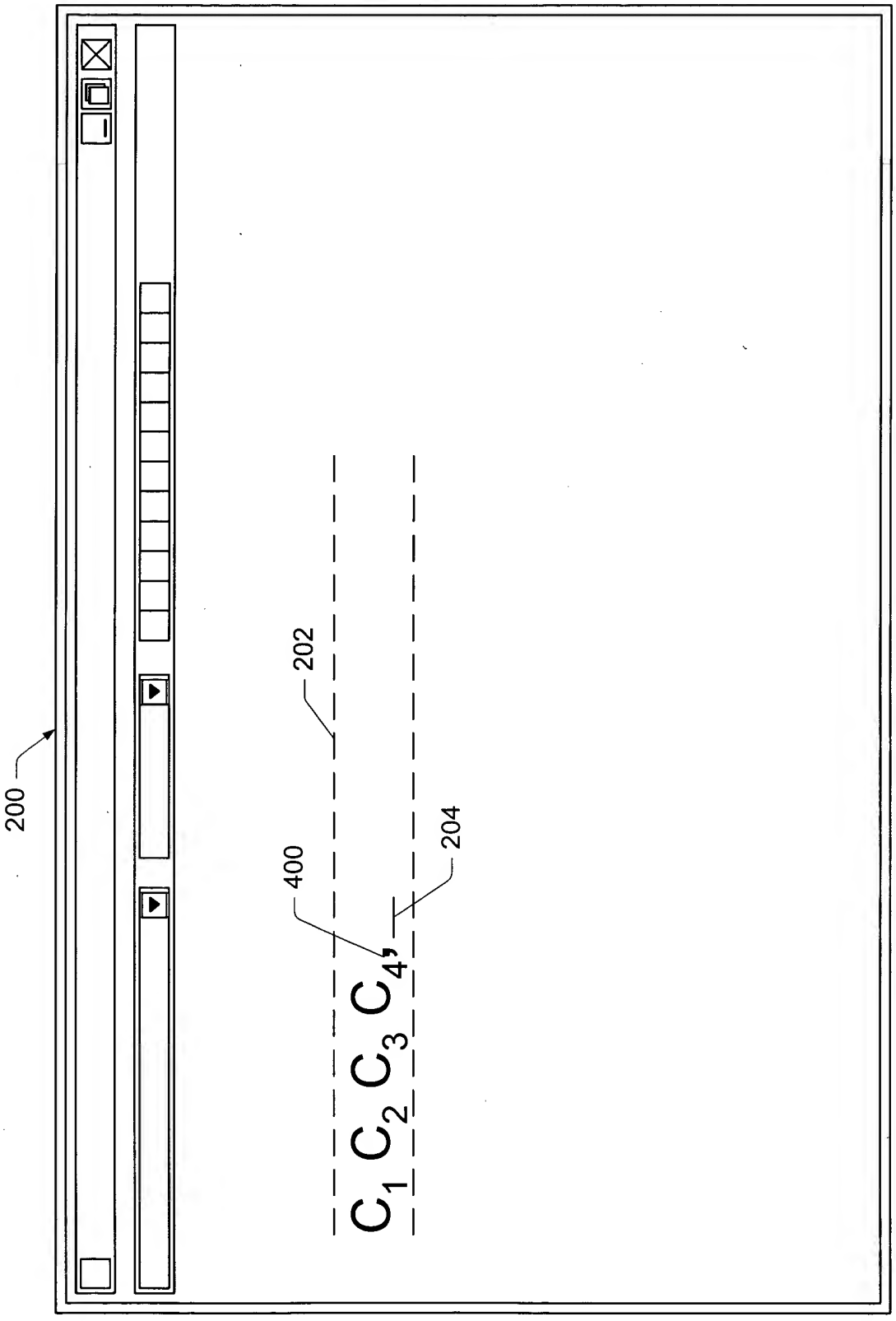

Fig. 4

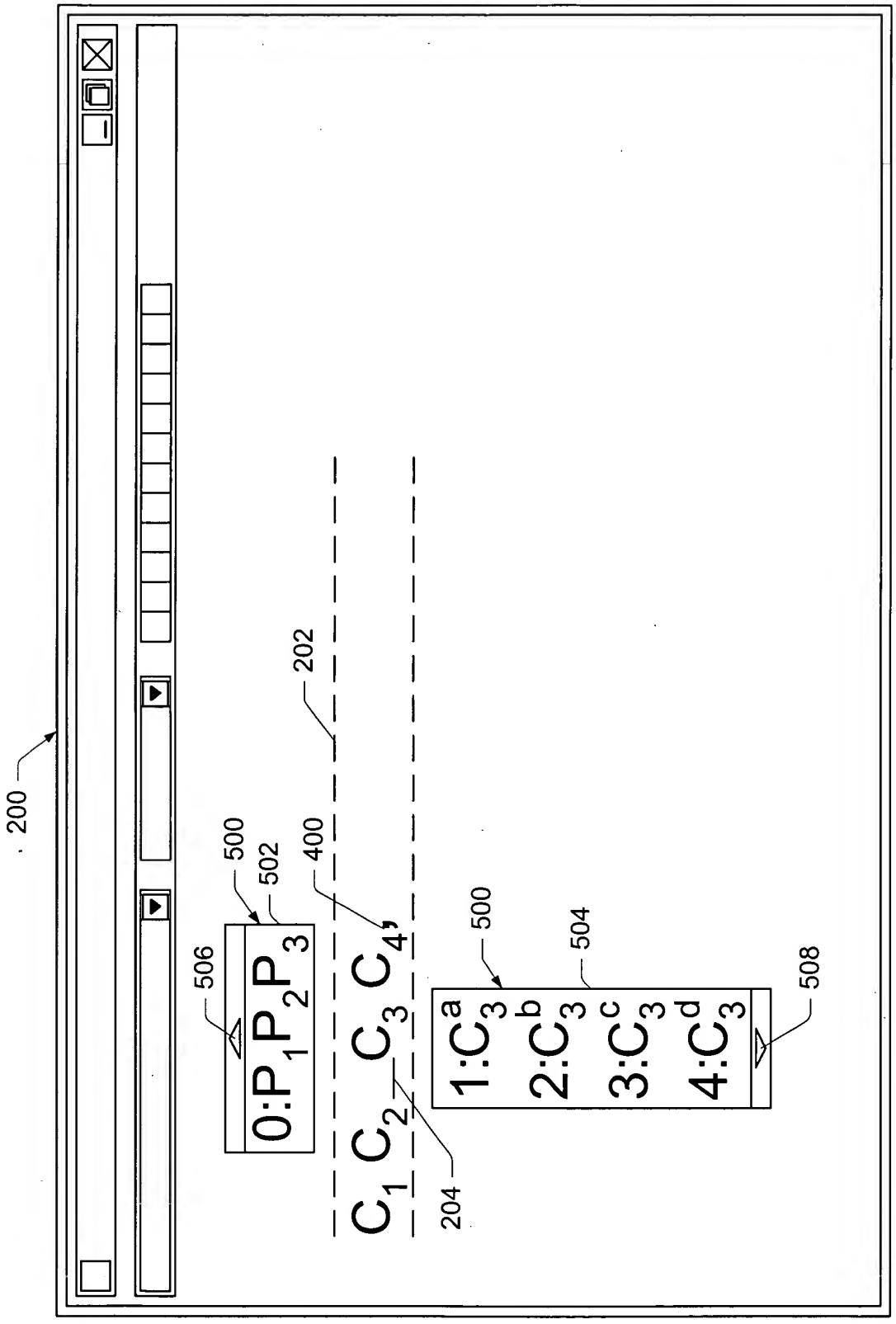
200
202
400
500
502
506
0:P1P2P3
C1 C2 C3 C4'
204
500
504
508
1:C3a
2:C3b
3:C3c
4:C3d

Fig. 5

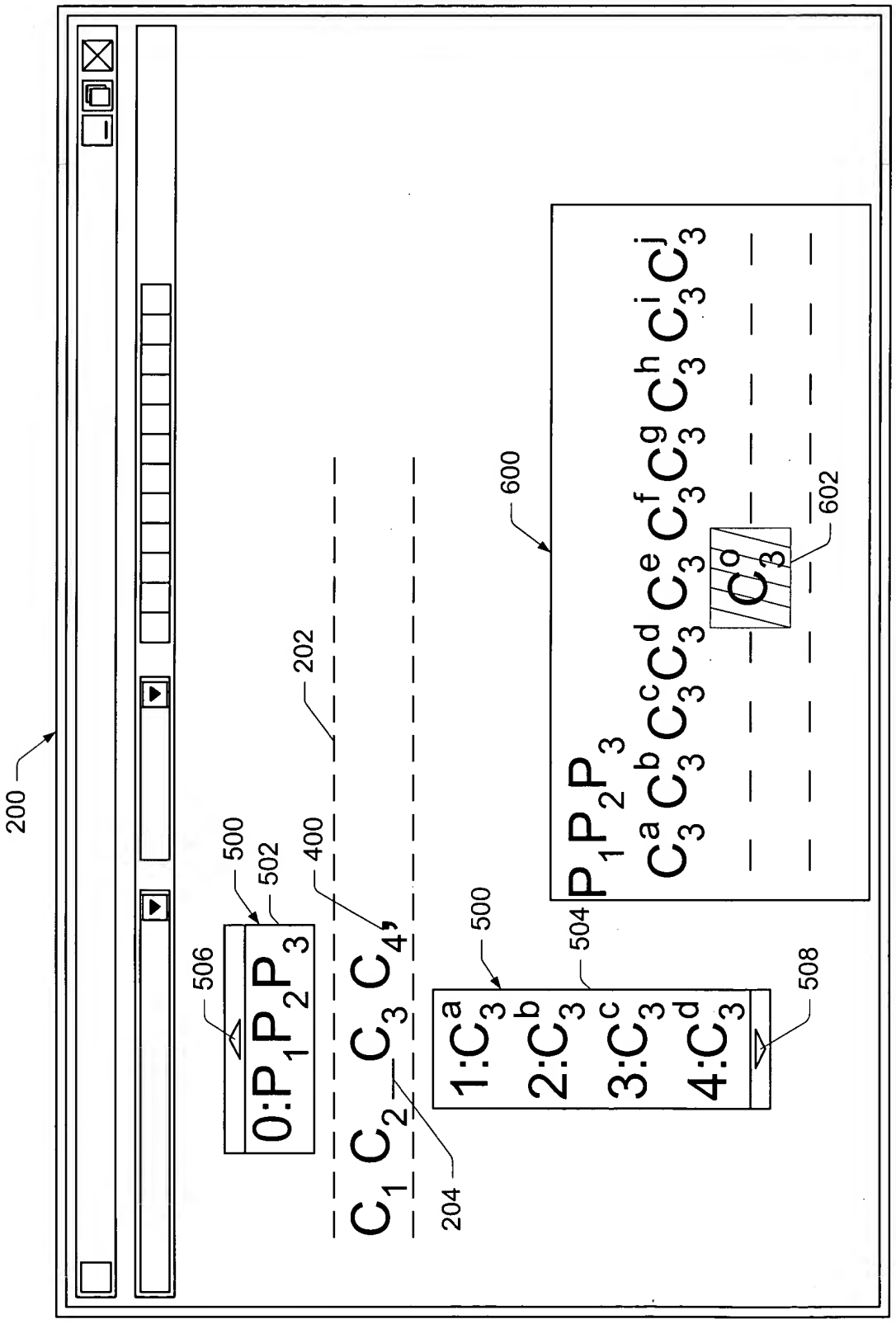
200
202
400
500
502
506
0:P1P2P3
C1 C2 C3 C4'
204
500
504
1:C3a
2:C3b
3:C3c
4:C3d
508
600
P1P2P3
C3a C3b C3c C3d C3e C3f C3g C3h C3i C3j
602
C3d

Fig. 6

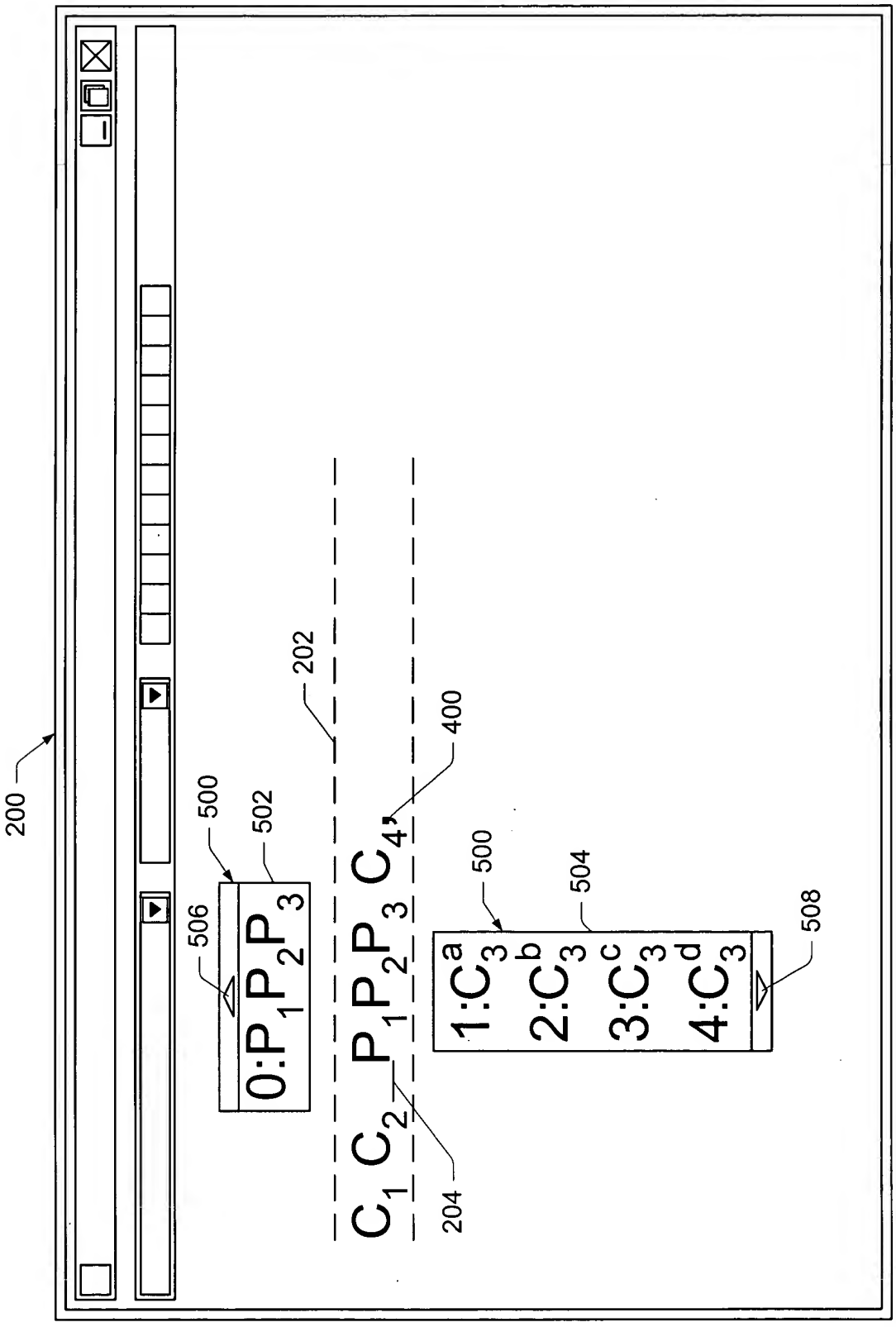
200
202
204
400
500
502
506
0:P1P2P3
C1 C2 P1P2P3 C4'
500
504
508
1:C3a
2:C3b
3:C3c
4:C3d

Fig. 7

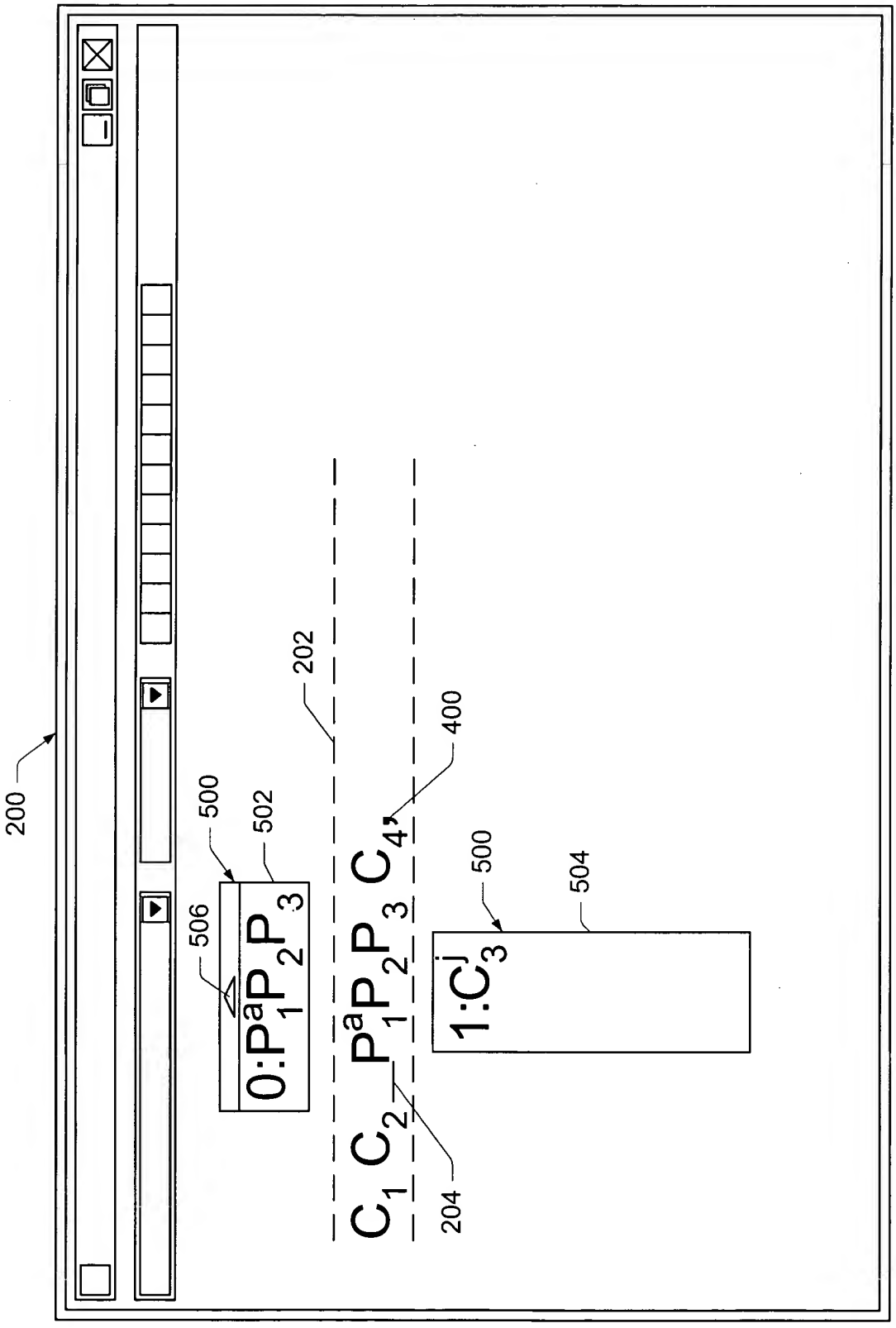
200
202
400
500
502
506
0:P1aP2P3
C1 C2 P1aP2P3 C4'
204
500
504
1:C3j

Fig. 8

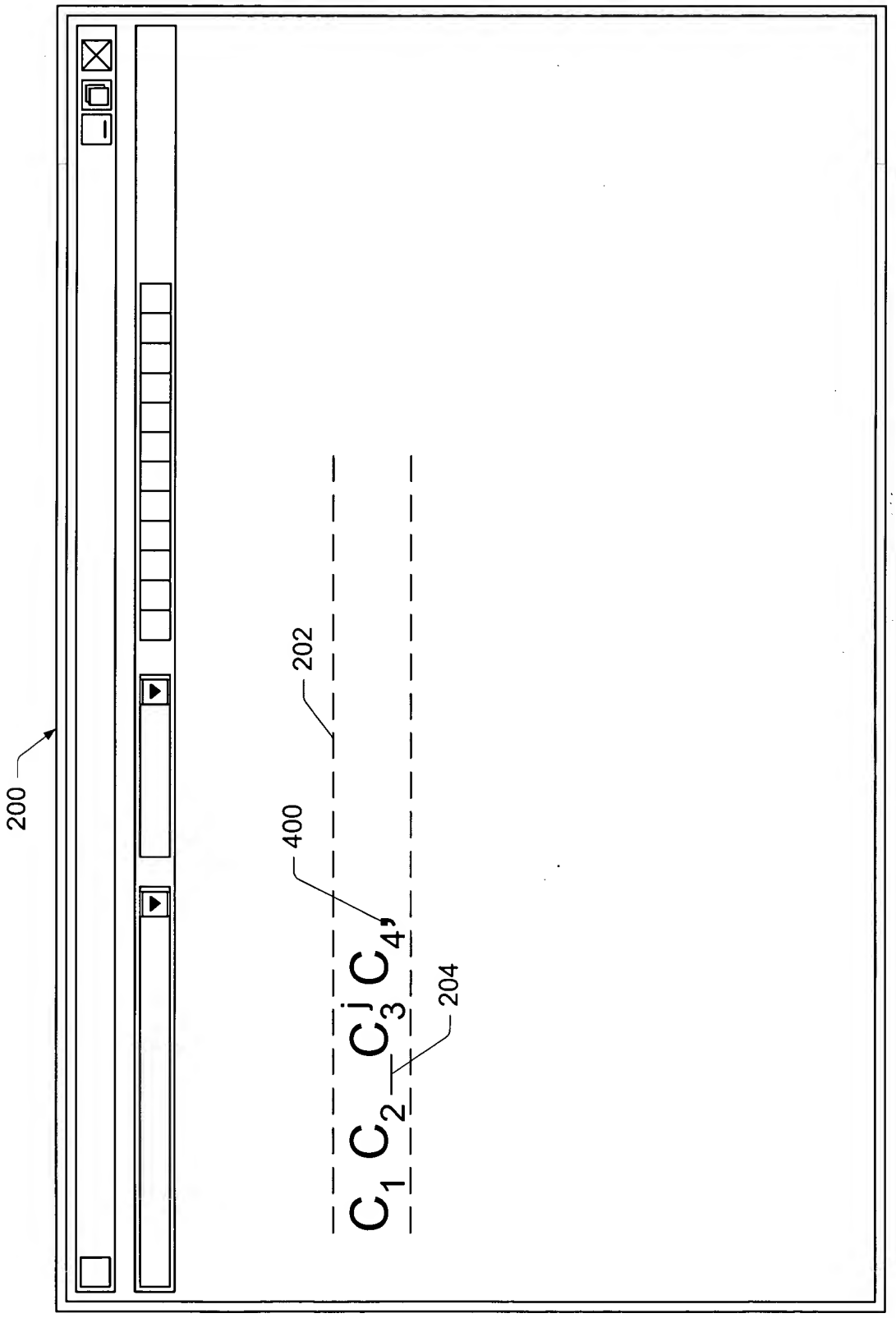

Fig. 9

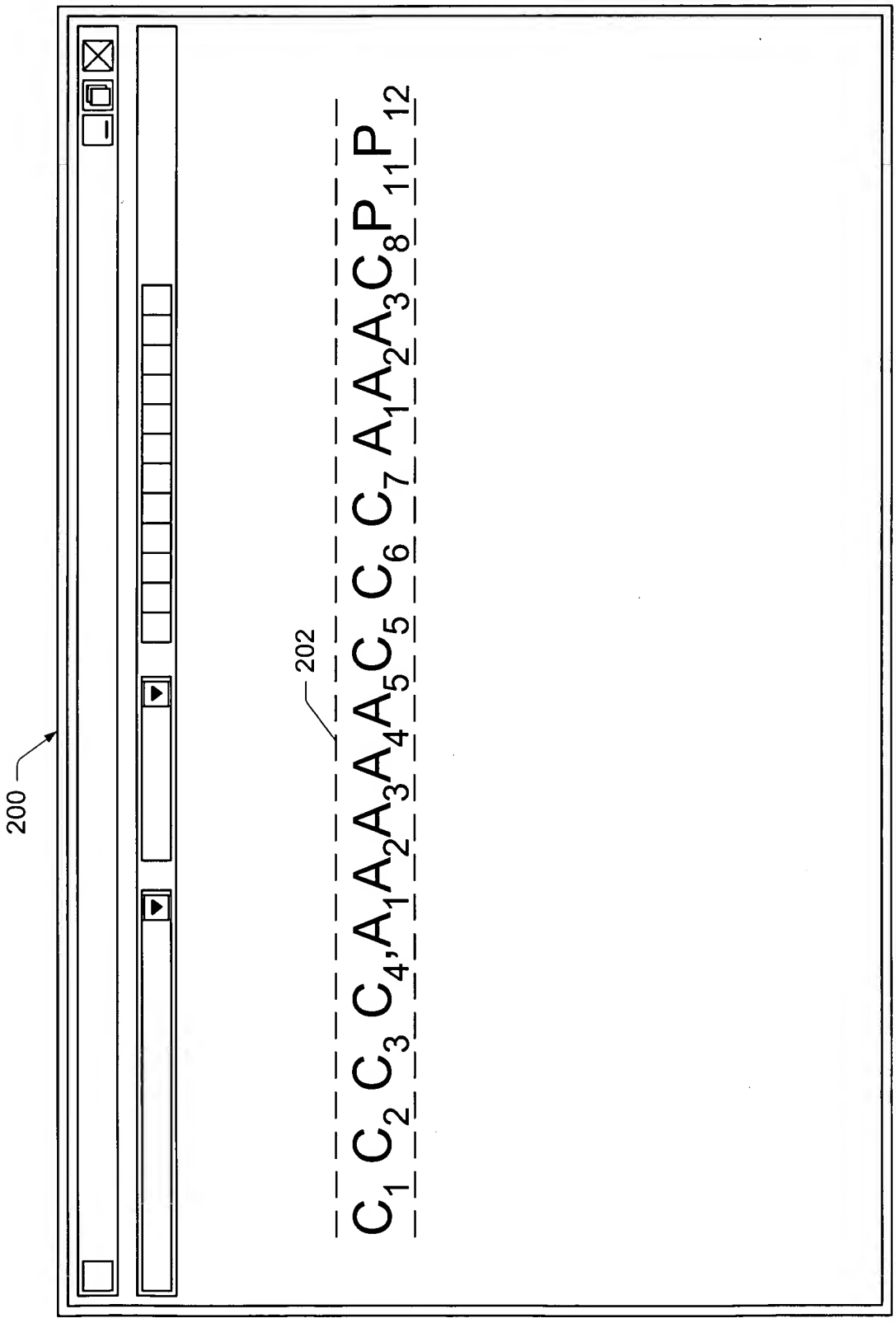

Fig. 10

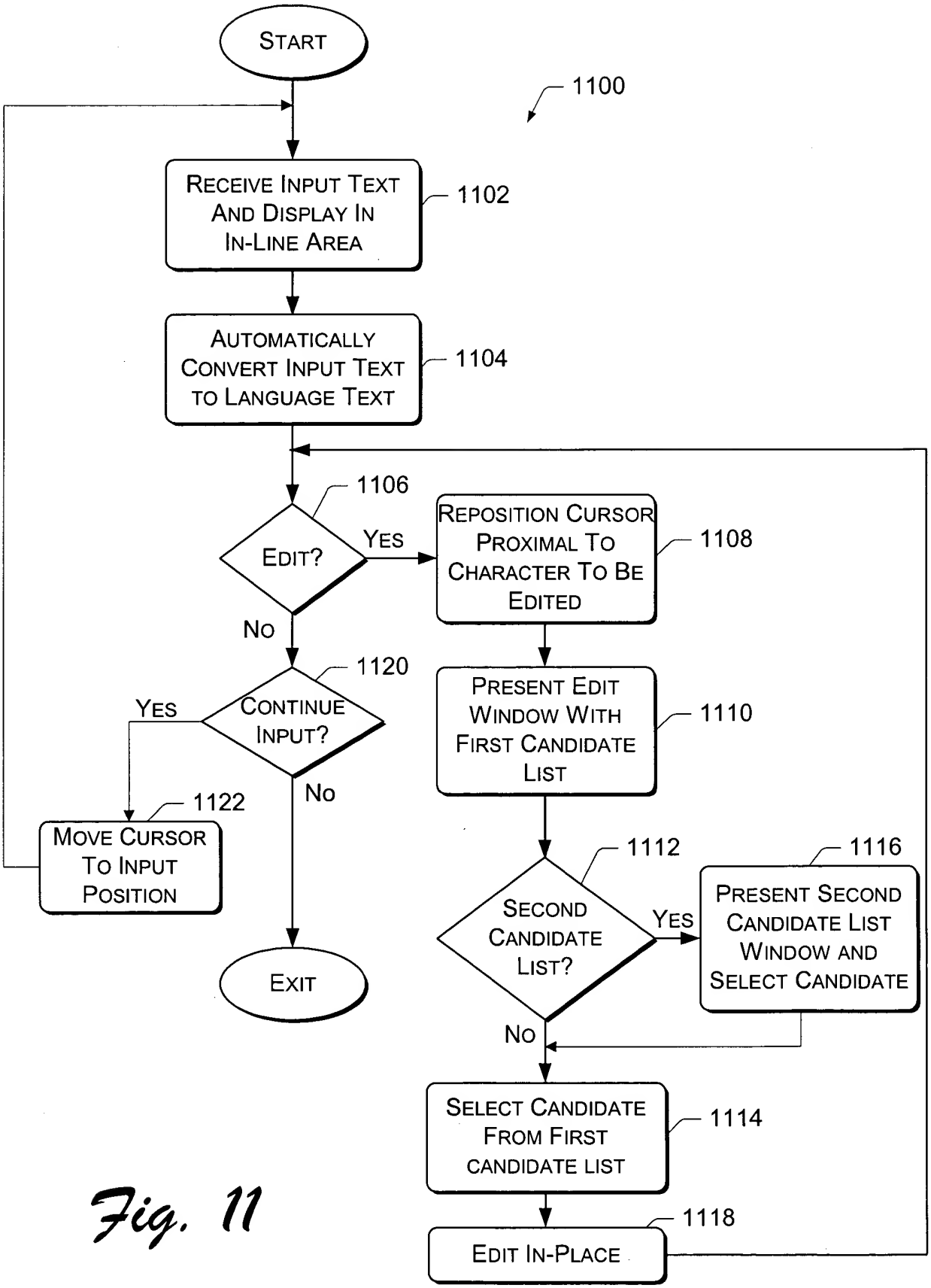
START
1100
RECEIVE INPUT TEXT AND DISPLAY IN IN-LINE AREA
1102
AUTOMATICALLY CONVERT INPUT TEXT TO LANGUAGE TEXT
1104
1106
EDIT?
YES
REPOSITION CURSOR PROXIMAL TO CHARACTER TO BE EDITED
1108
NO
1120
CONTINUE INPUT?
YES
PRESENT EDIT WINDOW WITH FIRST CANDIDATE LIST
1110
No
1122
MOVE CURSOR TO INPUT POSITION
1112
SECOND CANDIDATE LIST?
YES
1116
PRESENT SECOND CANDIDATE LIST WINDOW AND SELECT CANDIDATE
EXIT
No
SELECT CANDIDATE FROM FIRST CANDIDATE LIST
1114
1118
EDIT IN-PLACE

Fig. 11

Operations 1102 & 1104: In-Line Input and Display

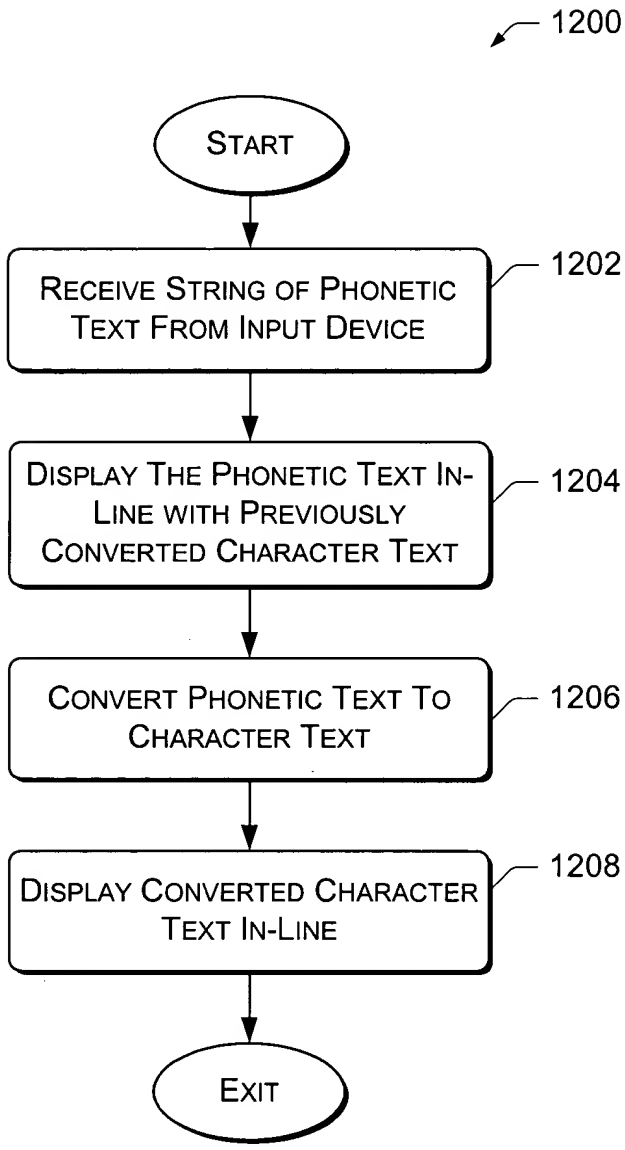

Fig. 12

Operation 1104: Sentence-Based Automatic Conversion

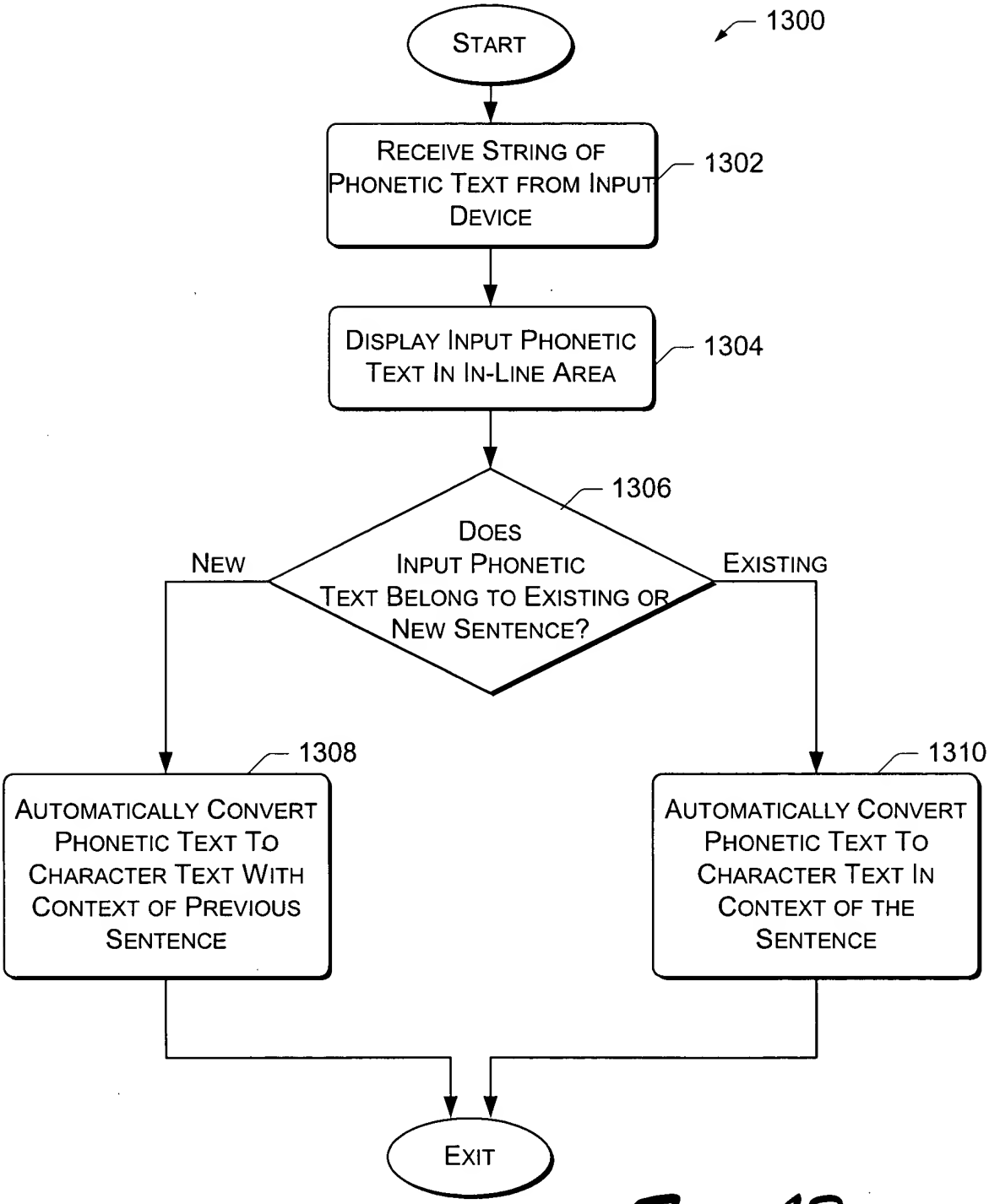

Fig. 13

3060301.1:3060300

Operation 1104: Automatic Conversion With Confirmation

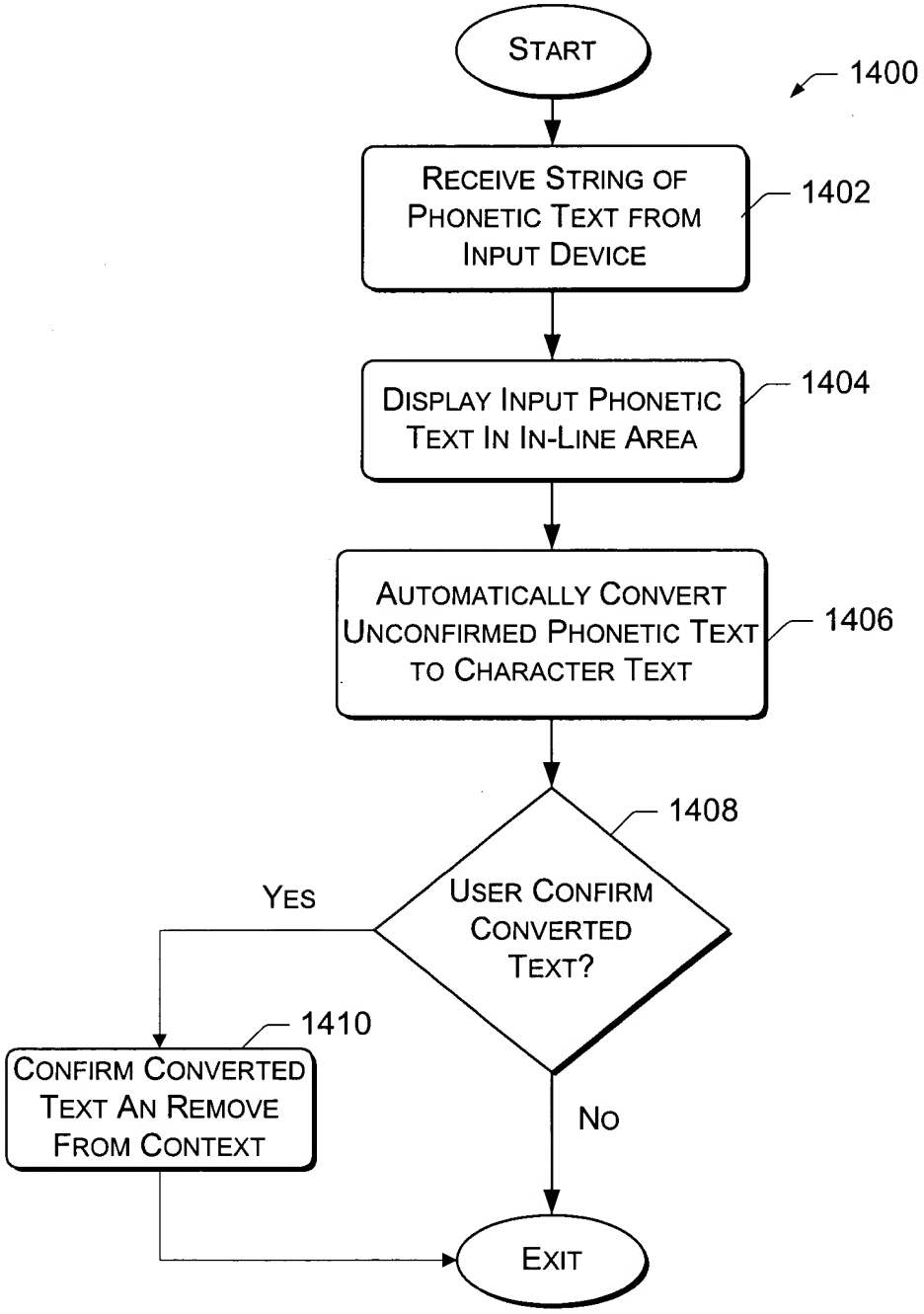

Fig. 14

Operations 1108-1118: In-Place Error Correction via First Candidate Window

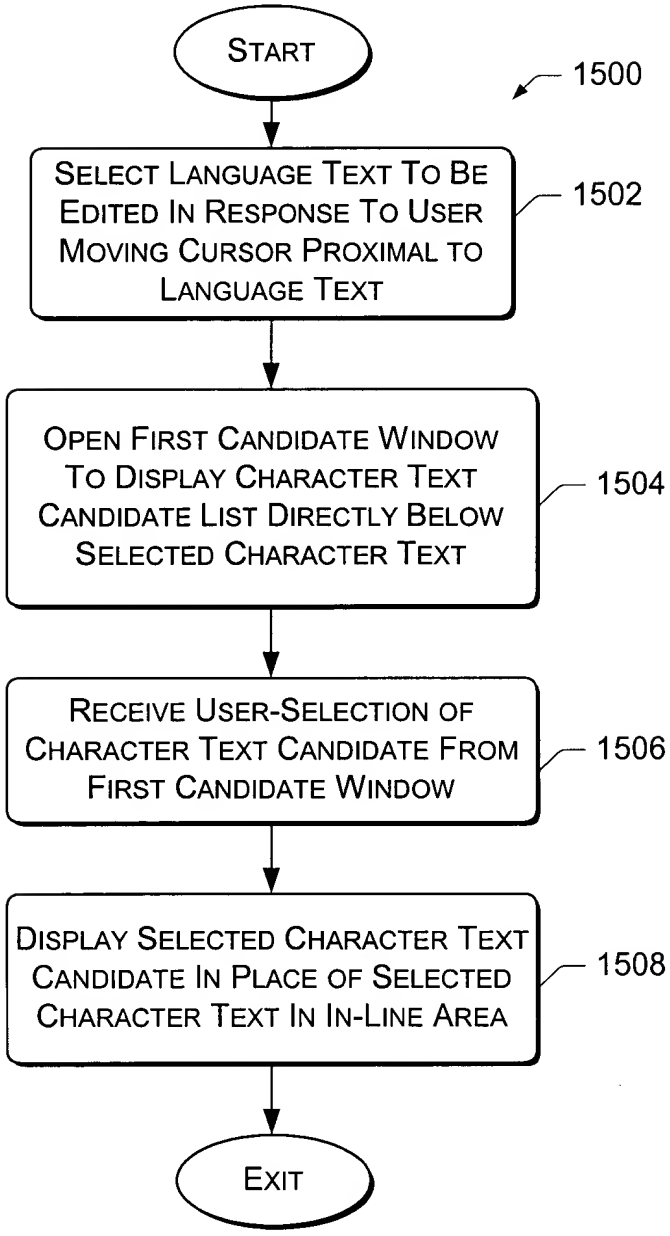

Fig. 15

Operations 1108-1118: In-Place Error Correction via Second Candidate Window

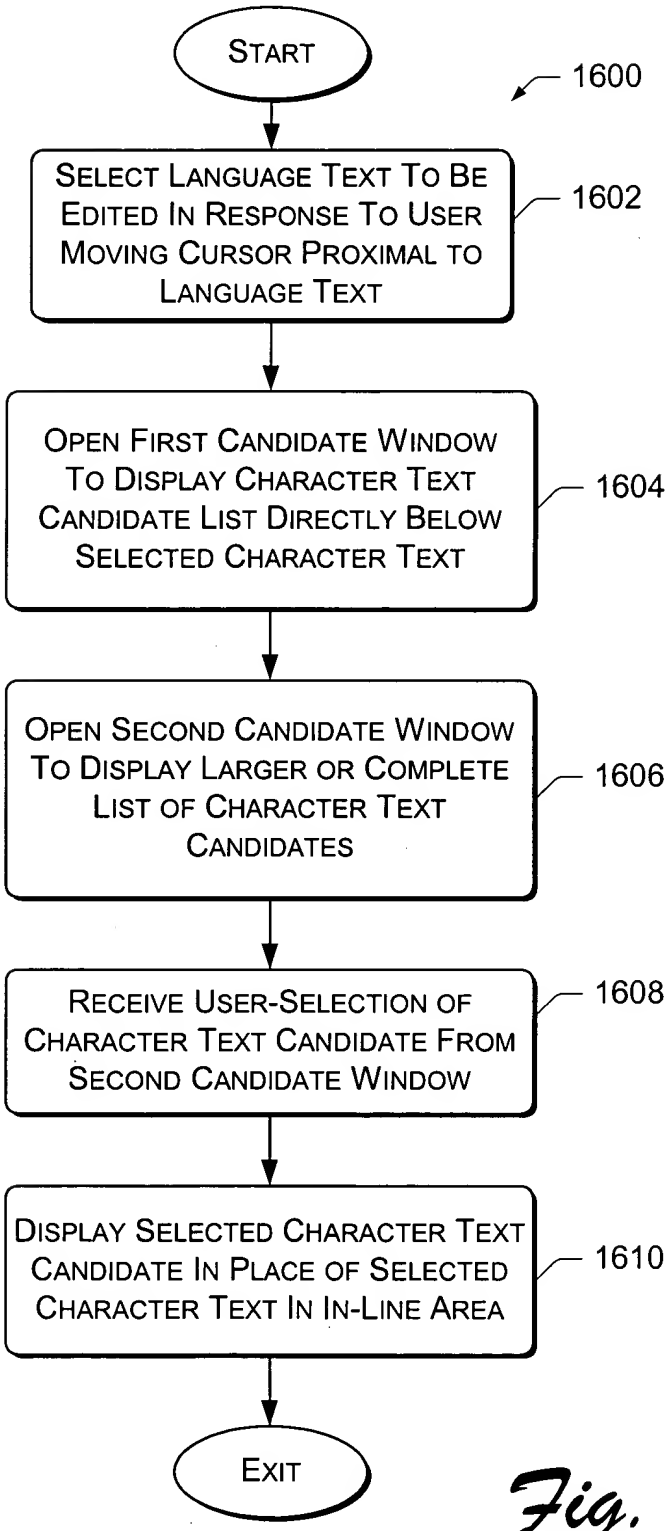

Fig. 16

3060.1 - 060303

Operations 1108-1118: In-Place Error Correction via Phonetic Text Hint Window

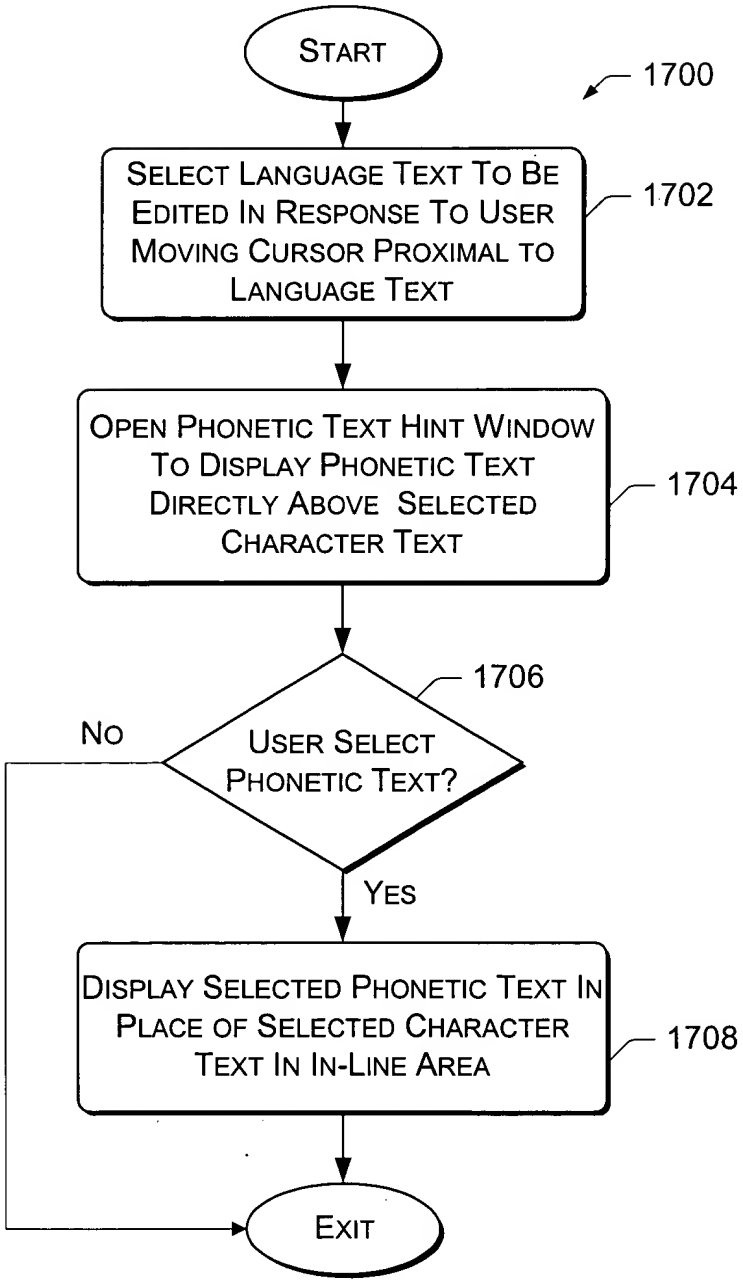

Fig. 17

3060044.01

Operations 1108-1118: In-Place Error Correction via Phonetic Text Hint and Candidate Windows

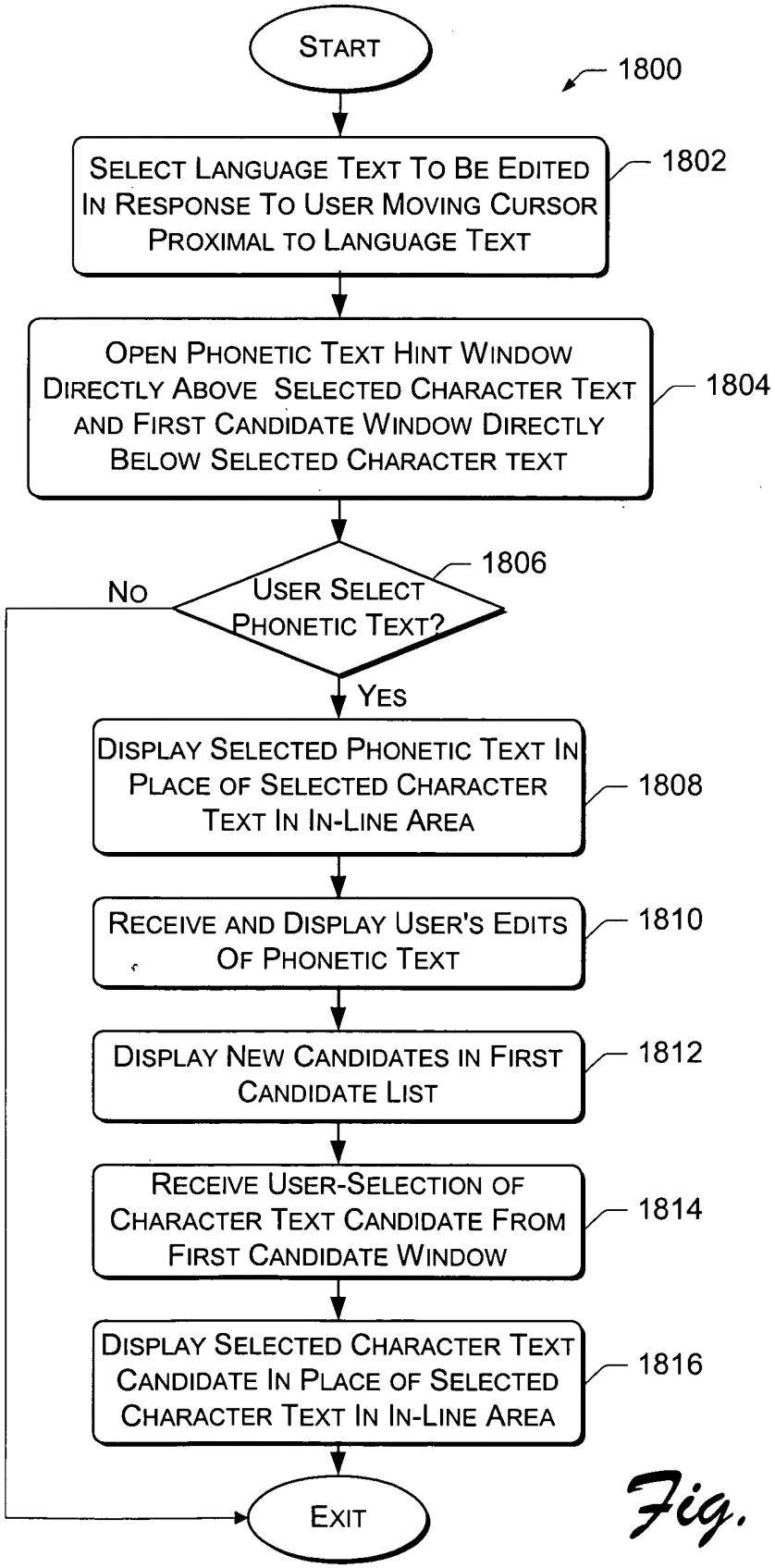

Fig. 18

3060041.01

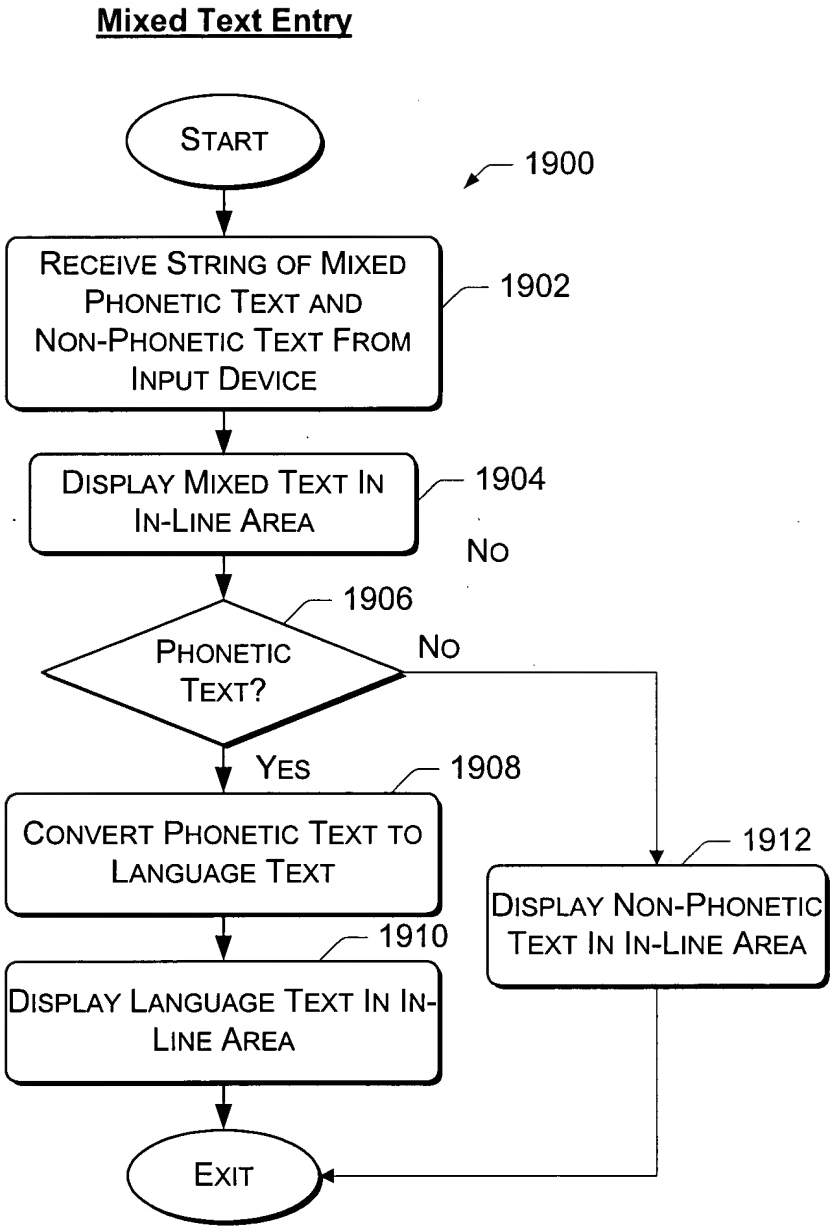
Mixed Text Entry
START
1900
RECEIVE STRING OF MIXED PHONETIC TEXT AND NON-PHONETIC TEXT FROM INPUT DEVICE
1902
DISPLAY MIXED TEXT IN IN-LINE AREA
1904
NO
1906
PHONETIC TEXT?
NO
YES
1908
CONVERT PHONETIC TEXT TO LANGUAGE TEXT
1912
DISPLAY NON-PHONETIC TEXT IN IN-LINE AREA
1910
DISPLAY LANGUAGE TEXT IN IN-LINE AREA
EXIT

Fig. 19

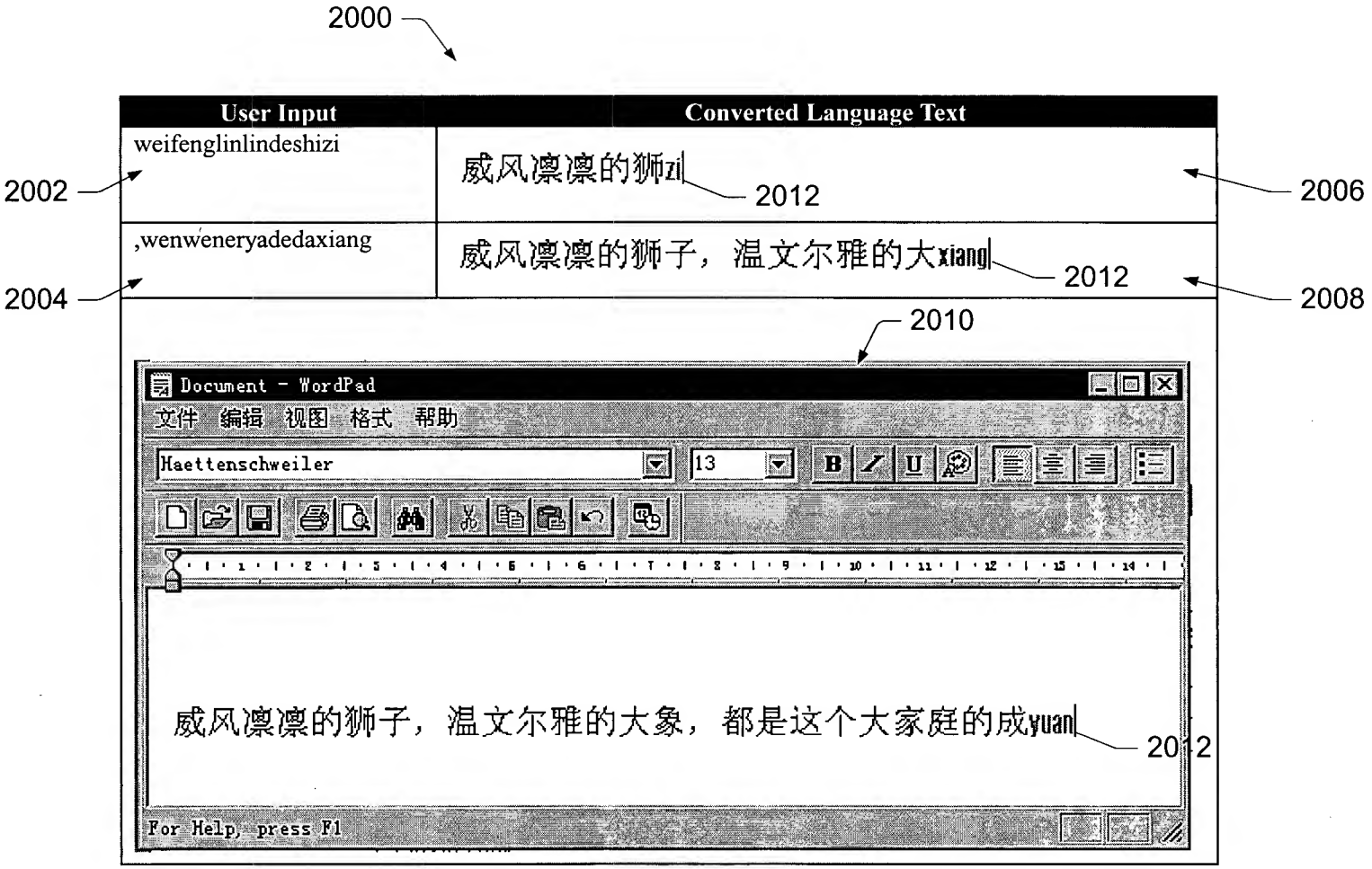
2000
User Input
Converted Language Text
weifenglinlindeshizi
威风凛凛的狮zi
2002
2012
2006
,wenweneryadedaxiang
威风凛凛的狮子，温文尔雅的大xiang
2004
2012
2008
2010
Document - WordPad
文件 编辑 视图 格式 帮助
Haettenschweiler
13
威风凛凛的狮子，温文尔雅的大象，都是这个大家庭的成yuan
2012
For Help, press F1

Fig. 20

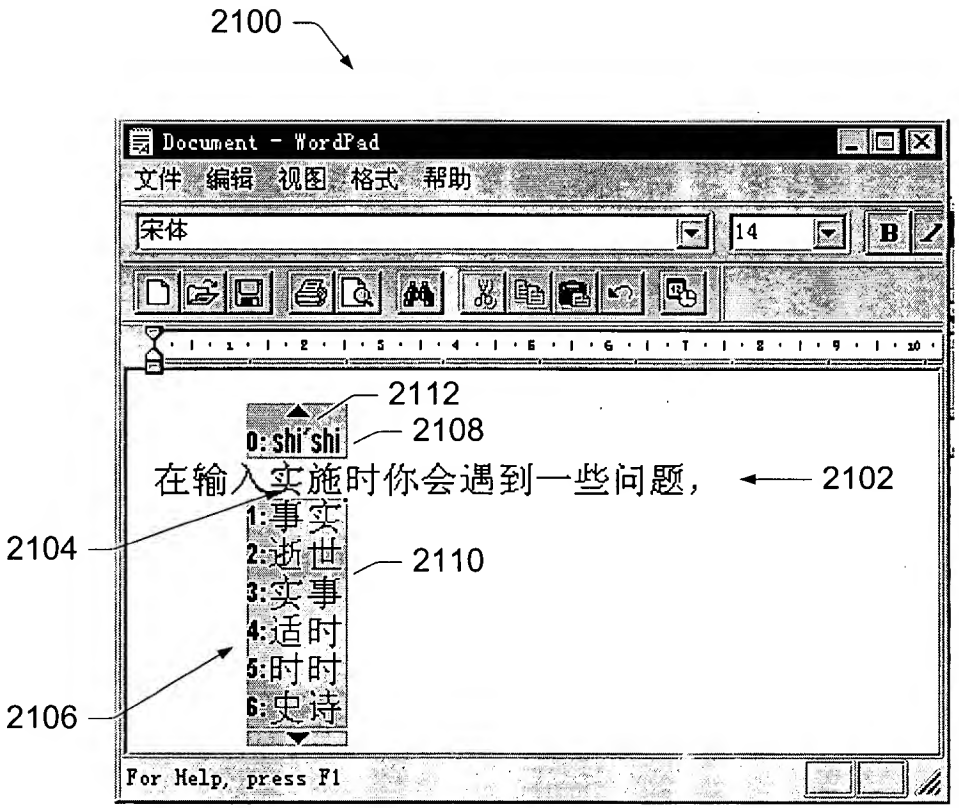
2100
Document - WordPad
文件 编辑 视图 格式 帮助
宋体
14
B
2112
0: shi'shi
2108
在输入实施时你会遇到一些问题，
2102
2104
1:事实
2:逝世
2110
3:实事
4:适时
5:时时
6:史诗
2106
For Help, press F1

Fig. 21

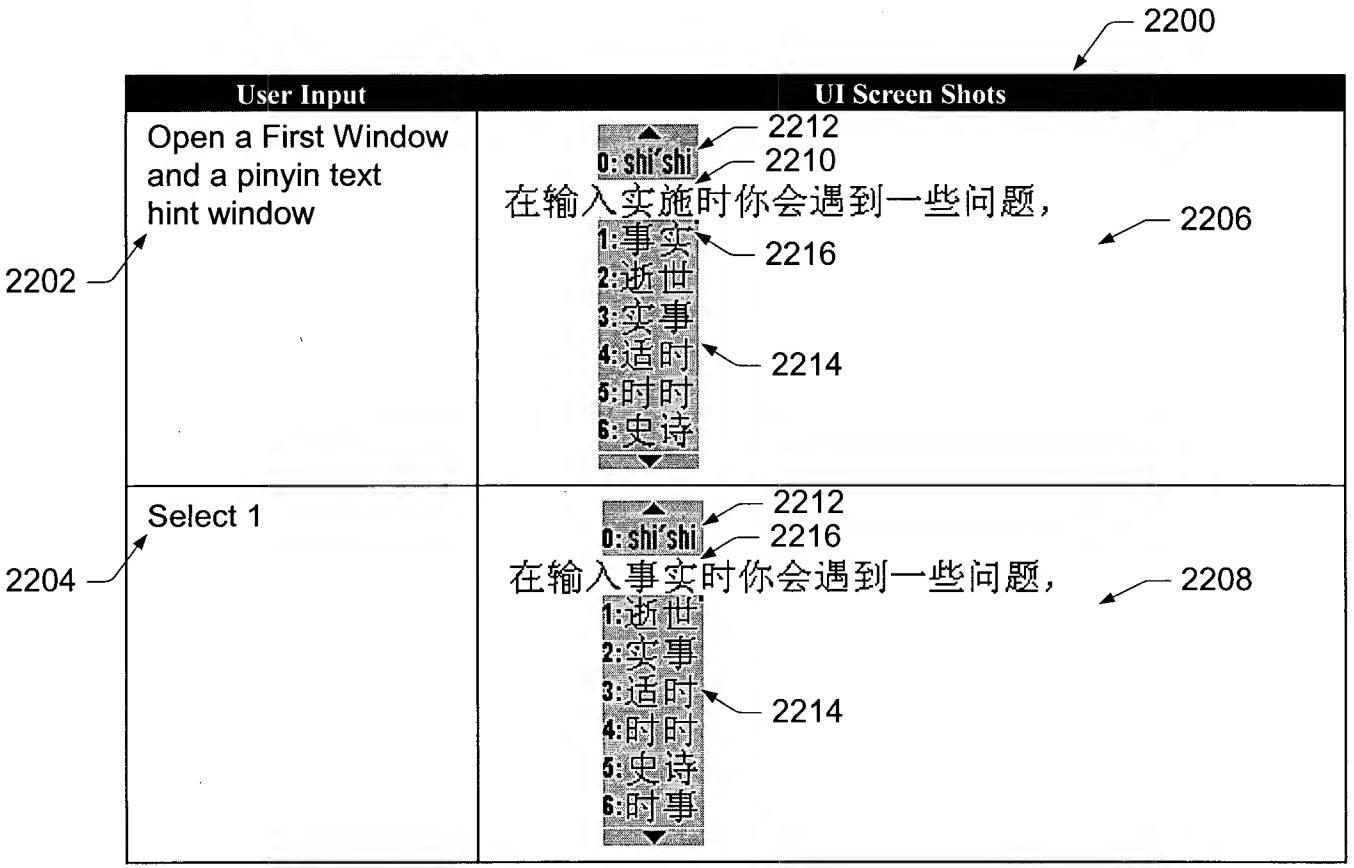
2200
User Input
UI Screen Shots
Open a First Window and a pinyin text hint window
2202
0: shi'shi
2212
2210
在输入实施时你会遇到一些问题，
2206
1:事实
2:逝世
3:实事
4:适时
5:时时
6:史诗
2216
2214
Select 1
2204
0: shi'shi
2212
2216
在输入事实时你会遇到一些问题，
2208
1:逝世
2:实事
3:适时
4:时时
5:史诗
6:时事
2214

Fig. 22

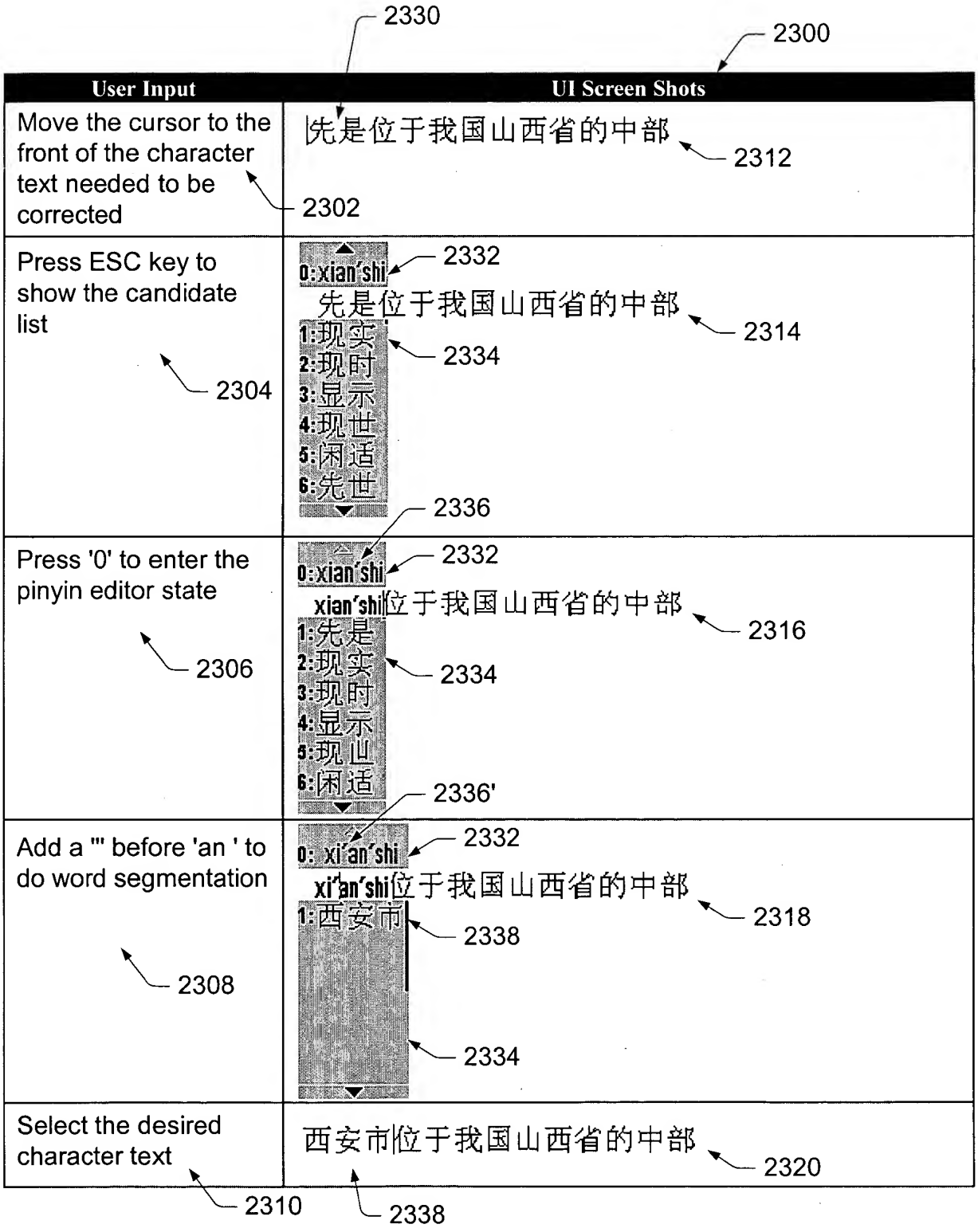

Fig. 23

3060044.02

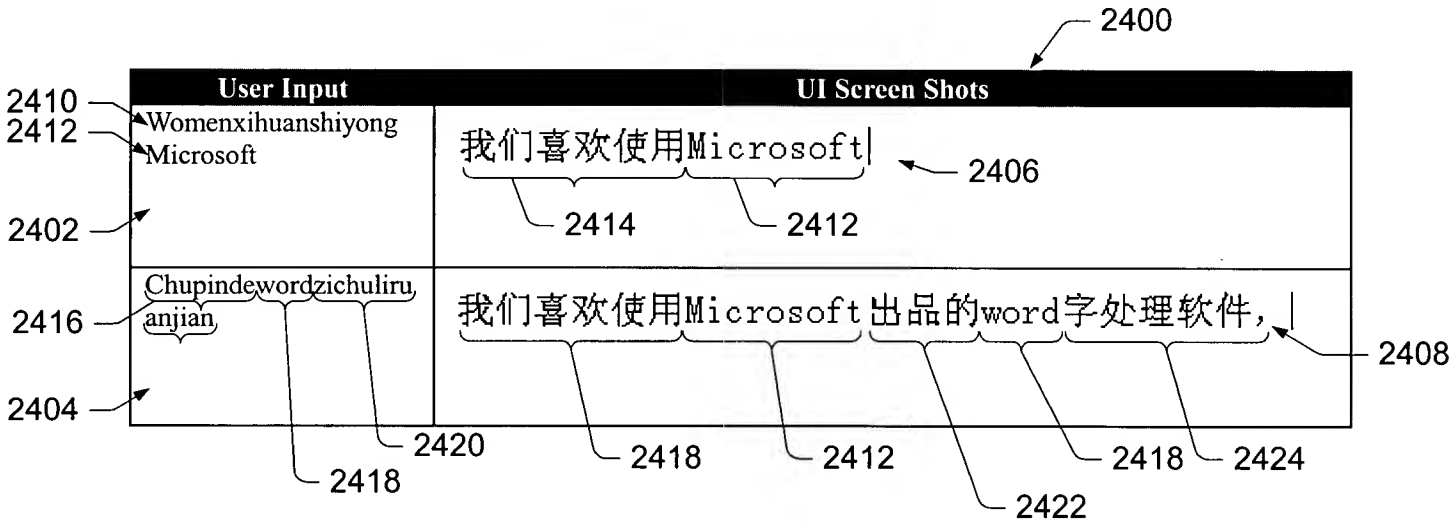
2400
User Input
UI Screen Shots
2410
2412
Womenxihuanshiyong
Microsoft
我们喜欢使用Microsoft
2406
2414
2412
2402
Chupindewordzichuliru
anjian
2416
我们喜欢使用Microsoft出品的word字处理软件，
2408
2404
2420
2418
2418
2412
2418
2424
2422

Fig. 24

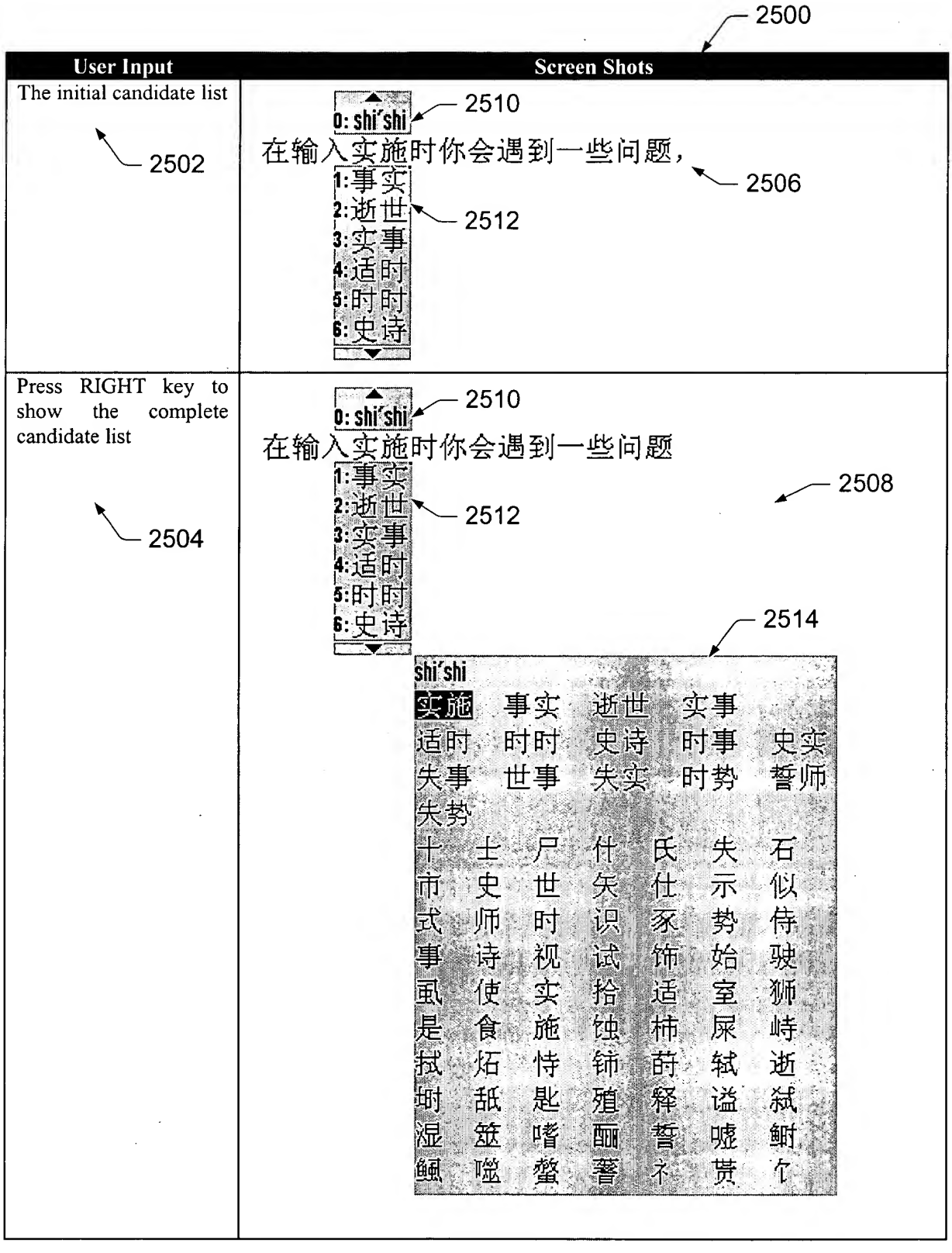
2500
User Input
Screen Shots
The initial candidate list
2502
0: shi'shi
2510
在输入实施时你会遇到一些问题，
2506
1:事实
2:逝世
3:实事
4:适时
5:时时
6:史诗
2512
Press RIGHT key to show the complete candidate list
2504
0: shi'shi
2510
在输入实施时你会遇到一些问题
2508
1:事实
2:逝世
3:实事
4:适时
5:时时
6:史诗
2512
2514
shi'shi
实施 事实 逝世 实事 史实
适时 时事 史诗 时势 誓师
失事 时世 失实 时时 石似
失势 士史 尸世 什氏 失示 侍驶
十市 师诗 时视 矢仕 势始 狮峙
式事 使食 实施 识饰 室屎 逝弒
虽是 炻舐 恃匙 试适 屎铖 谥鲋
拭蚶 筮嗌 嗜螯 拾柿 铖嘘 忙
湿鲴 殖酾 释誓 赏
衩

Fig. 25

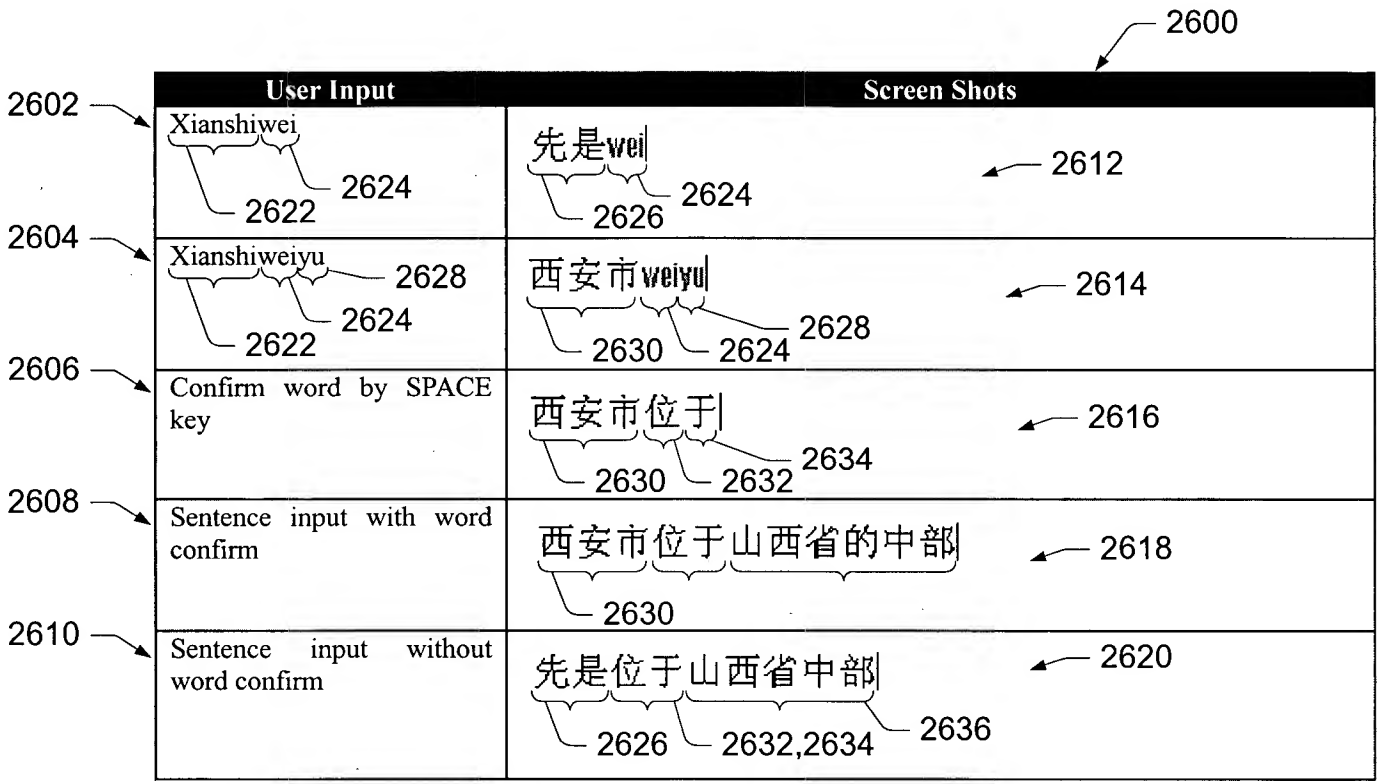
2600
User Input
Screen Shots
2602
Xianshiwei
2624
2622
先是wei
2624
2626
2612
2604
Xianshiweiyu
2628
2624
2622
西安市weiyu
2628
2630
2624
2614
2606
Confirm word by SPACE key
西安市位于
2634
2630
2632
2616
2608
Sentence input with word confirm
西安市位于山西省的中部
2630
2618
2610
Sentence input without word confirm
先是位于山西省中部
2636
2626
2632,2634
2620

Fig. 26

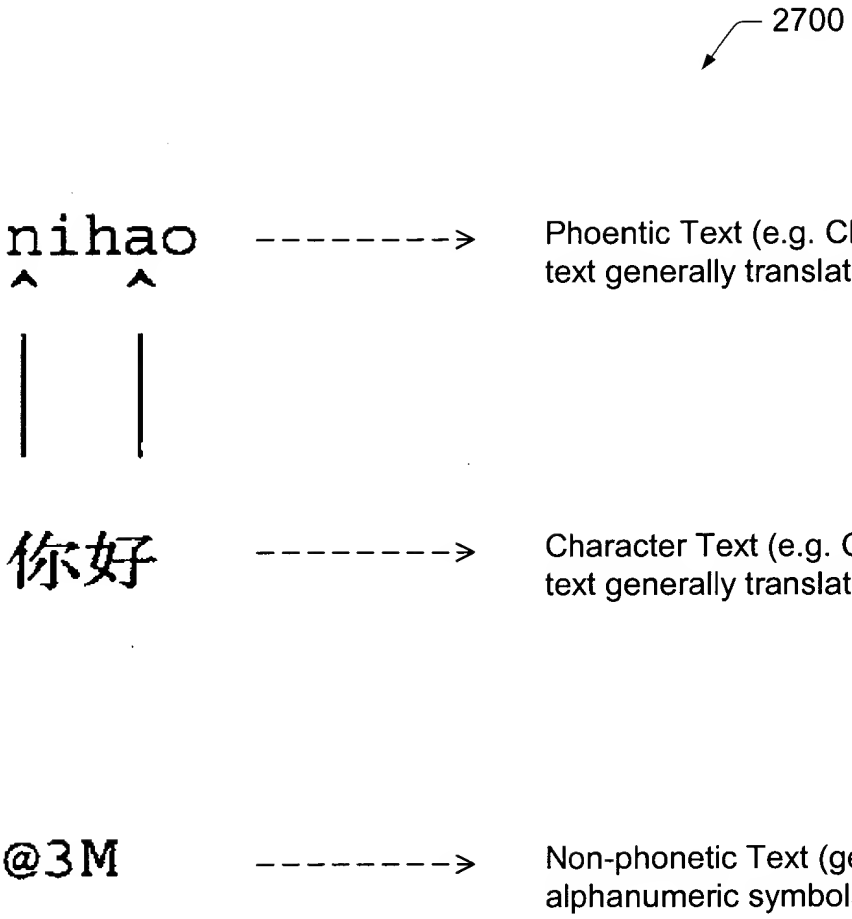
2700
nihao
Phoentic Text (e.g. Chinese Pinyin text generally translating to "hello")
你好
Character Text (e.g. Chinese Character text generally translating to "hello")
@3M
Non-phonetic Text (generally including alphanumeric symbols)

Fig. 27